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C-0/11/	3. RECIPIENT'S CATALOG NUMBER
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DR-1002 1	
TITLS (and Submire)	5. TYPE OF REPORT & PERIOD COVERE
19702A GSRS	
Missile Number 087-	
Round Number B-11.	6. PERFORMING ORG. REPORT NUMBER
Round Hamber B-11	C. PER ORMING ONG. REPORT NOMBER
7. AUTHOR(e)	8. CONTRACT OR GRANT NUMBER(*)
" AS I MORES	(7)
(11)	170000
WSMR/Meteorological	1T6657,2D126602
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INTRODUCTION

19702A GSRS , Missile Number 087 , Round Number B-11 , was launched from LC-33 , White Sands Missile Range (WSMR), New Mexico, at 1155 MST, 23 April 1979 . The scheduled launch time was 1145 MST.

DISCUSSION

Meteorological data were recorded and reduced by the White Sands Meteorological Team, Atmospheric Sciences Laboratory (ASL), White Sands Missile Range, New Mexico. The data were obtained by the following methods:

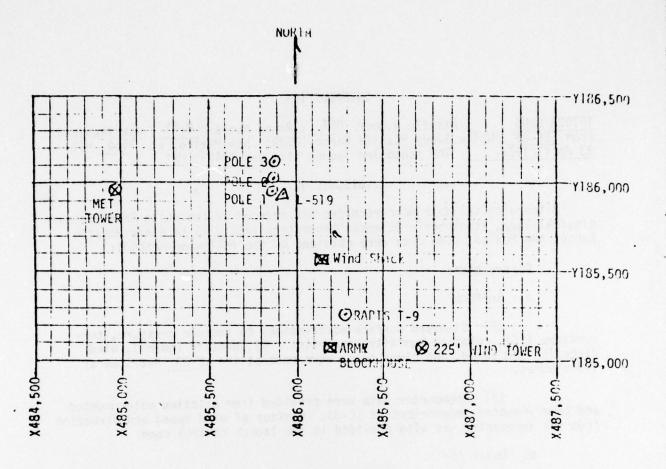
- 1. Observations
 - a. Surface
- (1) Standard surface observations to include pressure, temperature (°C), relative humidity, dew point (°C), density (gm/m^3) , wind direction and speed, and cloud cover were made at the <u>LC-33</u> Met Site at T-0 minutes.
- (2) Anemometer data were provided from existing pole-mounted and tower-mounted anemometers at LC-33. Monitor of wind speed and direction from one anemometer was also provided in the launch control room.
 - b. Upper Air
- (1) Low level wind data were obtained from RAPTS T-9 pibal observation at:

SITE AND ALTITUDE

- LC-33 1 kilometer (50-meter increments) 1145 MST
- LC-33 1 kilometer (50-meter increments) 1155 MST
- (2) Air structure data (rawinsonde) were collected at the following Met Sites. Data were collected from surface to 39,500 feet in 500-feet increments.

SITE AND TIME

SMR Met Site at T-0 minutes



- MET TOWER 4 Bendix Model T-120 Anemometers at 12 ft, 62 ft, 102 ft and 202 ft with E/A recorders in Mind Shack.
- 2. POLE ANEMOMETER Bendix Model T-120 with E/A recorders in Wind Shack
 - (a) Pole #1 38.7 ft
 - (b) Pole #2 53.0 ft
 - (c) Pole #3 83.6 ft
- 225 F1 WIND TOWER 5 Bendix Model T-120 Anemometers at 35 ft, 88 ft, 128 ft, 168 ft and 200 ft with 5 X-Y visual indicators in Blockhouse.
- 4. RAPTS T-9 Radar Automatic Pilot-Balloon Tracking System T-9 Radar

The data are presented in the following tabulations:

ELEVATION	3977.30	.FT/MSL
PRESSURE	878.5	MBS
TEMPERATURE	24.3	•c
RELATIVE HUMIDITY	35	*
DEW POINT	7.8	°C
DENSITY	1023	GM/M ³
WIND SPEED	CALM	MPH
WIND DIRECTION	1	DEGREES
CLOUD COVER	1	СЬ
CLOUD COVER	2	Cu
CLOUD COVER	7	Ci

TABLE I. SURFACE OBSERVATIONS TAKEN AT 1155 LOCAL TIME, 23 APRIL 1979, AT LC-33, 19702A GSRS, MISSILE NO. 087, ROUND NO. B-11.

LC-33 FIXED POLE AMEMOMETER MEASURED LINDS

	POLE #	1		POLE #2	,		POLE #3	3
T-TIME SEC	DIR	SPEED	T-TIME SEC	DEU	SPEED	T-11ME SEC	111 DEC	SPEED
-30	152	03	-30	143	07	-30 .	159	08
-20	128	05	-20	140	08	-20	161	08
-10	144	05	-10	147	07	-10	154	08
0.0	137	05	0.0	160	08	0.0	140	08
+10	145	05	+10	147	07	+10	143	09

POLE #1 = X485,074.29 Y185,958.90 H4018.74 38.7 ft. ACL

POLE #2 = X485,874.93 Y186,012.00 H4033.57 53.0 ft. AGL

POLE #3 = X485,877.29 Y186,116.06 H4063.92 83.6 ft. AGL

TABLEII							
TYPE 19702A G	SRS (FC)	ISSILE 110.	U87		יו מוווסי	C. B-11	l
LAUNCHED FROM	LC-33	DATE	23 Apri	1 1979	TIME	1155	LST
MOTE: MIND DIS	RECTIONS ARE	REFERENCED	TO THE	FIPIUN	AZIMUTH		
OF TRUE MORTH	TRUE NORTH						

LC-33 METEOROLOGICAL TOWER ANEMOMETER MEASURED WINDS (202 FT TOWER)

750 730	EVEL #1 12 ft		- 023gr	EVEL #2 62 ft	
T-TIME SEC	DIR DEG	SPEED MPH	T-TIME SFC	DIR DEG	SPEED MPH
-30	124	09	-30	120	. 09
-20	123	09	-20	105	09
-10	113	08	-10	113	07
0,0	105	08	0.0	125	05
+10	104	06	+10	101	06
SPE L	EVEL #3 102 ft		10	EVEL #4 202 ft	986
T-TIME SEC	DIR DFG	SPEED MPH	T-TIME SEC	DIR DEG	SPEED MPH
-30	124	11	-30	122	09
-20	134	11	-20	147	06
-10	131	09	-10	137	07
0.0	136	08	0.0	127	10
+10	150	09	+10	125	10

WTSM COORDINATES: X484,082.64 Y185,957.73 H3983.00 (base)

IARLE										
TYPE	19702A	GSRS (FC)	MISSILE	NO.	08	37	ROUND	NO.	B-11	
LAUNC	HED FROM	LC-33	DATE	23	April	1979	TIME	1155	5	MST
NOTE:	WIND D	IRECTIONS A	RE REFEREI	NCED	то тн	E FIRIT	IG AZIM	UTH		
OR TR	UE NORTH	TRUE NOR	TH .							

PILOT BALLOON MEASURED WIND DATA

HEIGHT METERS	DIR DEG	SPEED MPH
SUR	CALM	CALM
50	CALM	CALM
100	203	04
150	091	10
200	112	07
250	142	05
300	154	06
350	148	05
400	150	07
450	149	08
500	140	08

HEIGHT METERS	DIR	SPEED MPH
550	134	07
600	143	06
650	160	04
700	155	03
750	135	02
800	173	02
850	240	02
900	198	05
950	188	08
1000	196	09
1050		

TABLE IV										
RELEASED FROM	LC-33	DATE	23 A	pril	1979		TIME	114	5	LST
RELEASE POINT	COORDINATES	(WSTM)	x = 480	6,037	.24	Y = 18	2,350	.16	H = 3977	. 30
MISSILE TYPE	19702A GSRS	(FC) M	ISSILE	NO.	087		ROUND	NO.	B-11	
MISSILE LAUNCE	IED FROM L	C-33	DATE	23 A	pril	1979		TIME	1155	LST
NOTE: WIND D	RECTIONS ARE	REFERE	NCED TO) THE	FIRI	ISA DII	MUTH			
OR TRUE NORTH	TRUE NORTH									

PILOT BALLOON MEASURED WIND DATA

HEIGHT	DIR	SPEED
METERS	DEG	MPH
SUR	CALM	CALM
50	CALM	CALM
100	051	01
150	167	04
200	192	05
250	234	08
300	259	08
350	259	04
400	239	04
450	209	06
500	169	06

HEIGHT METERS	DIR	SPEED MPH
550	184	08
600	187	09
650	181	10
700	181	11
750	182	12
800	188	13
850	189	12
900	195	13
950	199	12
1000	213	11
1050		

TABLE y										
RELEASED FROM	LC-33	DATE	23 A	oril 1	979		TIME	115	5	LST
RELEASE POINT	COORDINATES	(WSTM)	X = 48	36,037	.24	γ =	182,350	.16	H =]	3977.30
MISSILE TYPE	19702A GSRS	(FC) M	ISSILE	NO.	087		ROUND	NO.	B-11	
MISSILE LAUNCH	IED FROM LC-	33	DATE	23 A	pril	1979		TIME	1155	LST
NOTE: WIND D	RECTIONS ARE	REFERE	NCED T	O THE	FIRI	NG AZ	HTUMI			
OR TRUE NORTH	TRUE NORTH									

STATION ALTITUDE 3997.30 FEET MSL 23 APR. 79 1100 HRS MST ASCENSION NO. 70

SIGNIFICANT LEVEL DATA 1130050070 S W R

GEODETIC COORDINATES
32.48034 LAT DEG
106.42307 LON DEG

REL.HUM. PERCENT	2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2
RATURE DEWPOINT CENTIGRADE	4 4 4 4 4 4 4 4 4 4 4 4 4 4 4 4 4 4 4
TEMPER AIR DEGREES	
GEUMETRIC ALTITUDE MSL FEET	\$9997 \$9997 \$9997 \$99973 \$99773 \$
PRESSURE MILLIBARS	88788 657000 7789900 77890000 7789000 7789000 7789000 7789000 7789000 7789000 77890000 7789000 7789000 7789000 7789000 7789000 7789000 77890000 7789000 7789000 7789000 7789000 7789000 7789000 77890000 7789000 7789000 7789000 7789000 7789000 7789000 77890000 7789000 7789000 7789000 7789000 7789000 7789000 77890000 7789000 7789000 77890000 77890000 778900000 778900000000000000000000000000000000000

STATION ALTITUDE 3997.30 FEET MSL 23 APP. 79 1100 HRS MST ASCENSION NO. 70

UPPER AIR DATA 1130060070 S M R

GEODETIC COORDINATES 32.48034 LAT DEG 106.42307 LON DEG

.42307 LON DEG	INDEX OF REFRACTION		000027	.00027	.00026	.00026	.00025	.00025	.00025	.00024	.00024	.00024	.00023	.00023	.00022	.00021	.00021	.00021	.00020	.0000	1.000262	.00019	.00019	.00018	.00018	·00018	.00017	.00017	.00016	.00016	.00016	.00015	.00015	.00015	.00014	.00014	.00014	.00014	.00014	.00013	.0001	.0001
106.	ATA SPEED KNOTS		2.1	2.1	5.6	3.0	3.4	3.9	4.2	4.0	6.7	8.5	8.5	8.3	7.6	7.2	7.0	6.9	6.9	7.0	7.1	7.5	7.7	7.8	7.2	7.3	8.5	10.6	11.5	12.2	12.5	13.3	14.3	15.3	16.4	17.9	18.9	16.1	16.9	14.6	13.2	12.3
	WIND DA DIRECTION DEGREES(TN)		30.	30.	35.	. +0	35.	36.	.50	55	32.	37.	33.	28.	19.	10	16.	23.	27.	55.	210.3	07.	03.	05.	17.	39.	90	14.	78.	82.	06	95.	96	95.	91.	.16	91.	95.	.66	. 40	.60	15
	SPEED OF SOUND KNOTS		674.	674.	665.	667	. 499	. 799	661.	689	658.	657.	656.	654.	653.	654.	651.	649	645.	.079	545.2	643.	641.	639.	636.	637.	635.	634.	633.	633.	635.	631.	62%	628.	627.	620.	624.	622.	621.	619.	517	610.
	DENSITY GW/CUBIC WETER	,	022	025	7	000	37	36	72	0	t	31	18	04	91	2	65	53	S.	3	817.9	07	0	85	5	0	51	39	27		0	30	5	93	57	47	50	S	1.5	10	6	91
	REL.HUM. PERCENT																				4.09																					
	PERATURE DEWPOINT CENTIGRADE					t• t	-		3.0			•	•	.5	-2.6	-3.2	0.41-	7.4-	-5.5	-6.2	-6.2	-6.8	6.6-	-10.6	-10.7	-12.6	-16.6	-21.5	-27.5	-28.0	-26.0	-27.4	-28.8	-30.3	-30.8	-30.4	-30.2	-30.2	-30.4	-31.2	-32.7	-35.0
	TEMPE AIR DEGREES C		ċ	2	0	3	9	+	13.7	i	-	0	•	•	•	•	•	•	•	•	9.	-1.1	-2.6	-3.9	-5.1	-6.5	-													-20.6		
NO. 70	PRESSURE MILLIBARS																				644.1																					454.9
ASCENSION NO	GEOMETRIC ALTITUDE MSL FEET			00	00	00	00	00	00	.0	0	0	00	00	00	0000	0500	10001	11500	2000	12500.0	3000	3500	0000	4500	5000	5500.	00009	0200	7000	1500	8000	3500	0006	9500	0000	0200	1000	1500	2000	2500	0

- C. C. C.

1130060070	SEODETIC CO
R ≥ S	32.4803

ALTITUDE	STATION ALII 23 APR. 79 ASCENSION NO	TUDE 39	97.30 FEE	EET MSL IS MST		113005007 S M R	2		JEODETIC 32.4 106.4	DETIC COOKDINATES 32.48034 LAT DEG 106.42307 LON DEG
416.2 224.2 -37.4 28.1 582.2 614.8 315.9 11.8 399.2 2.55.1 -40.0 23.1 572.5 613.7 318.4 11.6 399.2 2.55.7 -44.2 11.0 55.2 613.7 318.4 11.6 399.2 2.57.9 -44.2 11.0 55.2 613.7 318.4 11.6 11.6 399.2 2.57.9 -44.2 11.0 55.2 613.7 318.4 11.6 11.6 399.2 2.57.9 -44.0 17.7 524.7 603.0 297.9 17.0 524.7 603.0 297.9 17.0 524.7 603.0 297.9 17.0 524.7 603.0 297.9 17.0 524.7 603.0 297.9 17.0 525.7 563.7 563.0 297.9 17.0 525.7 563.7 563.0 289.7	COMETRIC TITUDE SL FEET	PRE	AIR GREE	ERATURE DEWPOINT CENTIGRAD	ERCENT	ENSITY M/CUBIC METER	0 010	WIND D DIRECTION SCREES(TW)	SPEE	INJEX OF REFRACTION
407.6 ~25.1 ~40.0 23.1 572.2 613.7 318.4 11.6 399.2 ~25.4 ~40.0 23.1 556.2 613.2 318.4 11.6 399.2 ~26.7 ~45.0 17.7 554.4 610.2 307.2 15.4 382.6 ~27.9 ~46.0 17.7 534.4 610.2 307.2 15.4 359.0 ~31.5 ~47.8 18.0 57.5 603.1 297.8 21.6 359.0 ~31.5 ~47.8 18.0 57.5 603.1 297.8 21.7 359.1 ~32.6 ~47.8 18.0 57.5 603.1 297.8 21.0 359.2 ~31.6 ~47.5 603.1 597.8 21.0 297.8 297.8 297.9 359.2 ~32.6 ~47.5 603.1 503.1 279.9 27.6 297.9 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6	23500.0	416.	-24.2		28.1	3	t	15.	11.8	.00013
399.2 -25.4 -43.2 17.0 561.2 512.4 512.5 512.4 513.2 512.4 512.7 512.5 512.7 5	24000.0		-25.1		23.1	0	.0	18.	11.6	.00012
390.8 -26.7 -44.1 17.2 552.2 611.7 507.2 13.7 390.8 -26.7 -44.1 17.5 542.4 610.2 507.2 13.7 37.9 550.1 607.1 295.8 17.6 550.7 -30.3 -46.9 17.9 550.1 607.1 295.8 17.6 550.1 607.1 295.8 17.6 550.1 607.1 295.8 17.6 550.1 607.1 295.8 17.6 550.1 607.1 295.8 17.6 550.1 607.1 295.8 17.6 550.1 607.1 295.8 21.0 295.6 -46.9 17.9 550.1 607.1 295.8 21.0 295.6 -46.9 17.9 550.1 607.1 295.8 21.0 295.0 -30.2	24500.0		-25.4	-	17.0	-	N	12.	12.5	.00012
352.6 -27.9 -45.0 17.5 543.4 610.2 502.3 15.4 502.3 502.5 502.5 -27.9 -46.0 17.7 552.1 602.6 297.9 17.6 502.0 502.0 502.0 17.6 502.0	25000.0		-26.7		17.2		-4	07.	13.7	.00012
374.6 -29.1 -46.0 17.7 534.7 604.6 297.9 17.6 359.7 -30.3 -46.9 17.9 535.1 607.1 293.8 21.0 359.0 -31.5 -48.7 18.0 506.5 604.3 269.7 24.8 343.8 -33.7 -52.7 12.6** 500.5 602.8 265.7 28.9 356.5 -34.9 -60.3 5.5** 400.1 280.7 28.7 352.0 -37.4 400.1 400.2 260.1 279.9 279.1 352.0 -37.4 400.2 594.1 279.1 279.1 279.1 352.0 -37.4 400.2 594.1 279.9 27.9 27.9 301.3 -41.2 400.2 594.1 279.9 27.9 27.9 201.3 -41.2 400.2 594.1 279.9 27.9 27.9 201.4 -44.7 400.2 594.1 279.1 27.9 27.9 202.1 -48.7 590.1 274.2 27.9 27.9	25500.0		-27.9		17.5	3	0	.70	15.4	.00012
366.7 30.3 -46.9 17.9 550.1 607.1 295.8 21.0 359.0 31.5 -46.9 17.9 550.1 602.0 290.8 290.8 28.7 130.5 -40.3 20.2 20.0 290.8 28.7 130.5 -52.7 12.6** 500.2 602.0 290.8 28.7 28.7 250.2 350.2 37.4 40.0 502.9 594.1 275.7 276.7 28.8 152.0 304.1 40.0 595.5 275.4 40.0 596.5 275.7 275	25000.0		-29.1		17.7	:	0	. 16	17.6	.00012
359.0 -31.5 -47.8 18.0 517.5 602.0 290.8 24.8 345.5 -48.7 18.0 506.7 604.3 283.7 28.9 345.5 -34.9 -50.3 5.5** 4.92.1 601.3 283.7 28.9 329.2 -30.2 -37.4 -60.3 5.5** 4.92.1 601.3 283.7 27.9 27.9 27.9 27.9 27.9 27.9 27.9 27	26500.0		-30.3	-	17.9	•	~		21.0	.00011
351.4 -32.6 -48.7 18.0 506.7 604.3 288.7 28.9 343.8 -33.7 -52.7 12.6** 500.3 602.8 287.4 28.7 329.2 -35.2 -60.3 5.5** 485.9 594.1 275.9 276 276 3220.0 -37.4 400.0 602.8 25.5 27.6 602.8 287.4 27.1 22.0 -37.4 400.0 602.8 25.5 27.6 27.6 27.6 27.6 27.6 27.6 27.6 27.6	27000.0		-31.5		18.0	1.	6.009	290.B	24.8	.00011
343.8 -33.7 -52.7 12.6** 500.5 602.8 267.4 28.7 325.5 -34.9 -60.3 5.5** 492.1 601.3 285.1 285.1 282.2 325.2 -30.2 -50.2 5.5** 492.1 601.3 285.1 282.2 322.0 -37.4 475.9 599.7 275.7 27.6 301.3 -41.2 2.5.7 4.6.0 596.5 275.7 27.6 301.3 -41.2 2.5.7 4.6.1 27.0 294.9 27.5 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.9 27.0 294.0 274.0 294.0 274.0 292.0 2	27500.0		-32.6		18.0		604.3	288.7	28.9	1.000114
336.5 -34.9 -60.3 5.5** 492.1 601.3 285.1 289.2 329.2 -30.2 4.9 -60.3 5.5** 492.1 601.3 285.1 289.2 329.2 -30.2 -30.2 4.4 4.5.9 599.7 272.4 27.6 302.0 -30.1 -40.0 -30.1 27.4 4.5.9 599.7 272.4 27.6 30.1 272.4 27.7 280.1 272.4 27.7 280.1 280.1 272.4 27.7 280.1 280.1 272.4 27.7 280.1 280.1 272.4 272.4 272.4 272.4 272.4 272.6 280.1 274.5 280.1 274.5 280.1 274.5 280.1 274.5 280.1 274.6 36.2 280.1 274.6 36.2 274.6 36.2 274.6 36.2 274.6 36.2 274.6 276.4 272.6 272.6 272.6	2800000		-33.7		*	ċ	8.209	4.782	28.7	1.000112
329.2 -35.2 329.2 -35.2 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.0 -37.4 322.1 -40.0 301.3 -41.2 29.6 -42.5 29.6 -42.5 29.6 -42.5 29.6 -42.5 29.6 -42.5 29.6 -42.5 29.7 29.8 -42.9 20.1 -27.9 20.2 -27.9 20.3 -27.9 20.3 -42.9 20.3	28500.0		-34.9		*	å	601.3	285.1	28.5	1.000110
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315.0 -38.7	29500.0		-37.4				590.1	275.7	27.6	1.000106
308-1 -40.0 308-1 -40.0 301-3 -41.2 294-6 -42.5 294-6 -42.5 294-6 -42.5 294-6 -42.5 28-8 28-8 28-9 -42.5 28-9 -42.9 28-9	3000000		-38.7				5.969	272.4	27.9	1.000104
201.3 -41.2 294.6 -42.5 284.6 -42.5 285.7 286.7 286.7 286.7 286.7 286.7 286.7 286.7 286.7 286.8 -47.3	30500.0		0.04-				6.459	273.9	28.0	1.000103
294.6 -442.5 30.4 444.8 591.7 275.3 30.4 287.9 287.9 31.8 281.4 444.9 429.5 586.5 274.0 33.2 275.0 -46.1 422.0 587.0 274.1 34.5 263.4 417.3 414.7 583.0 274.1 36.5 256.8 -49.8 58.0 582.0	2100010		-41.2			·	593.3	275.1	28.8	1.000101
261.4 -44.9 429.5 586.5 274.5 31.8 25.0 -44.9 429.5 586.5 586.5 274.0 33.2 266.8 -47.3 46.1 47.3 46.7 585.0 274.0 33.2 266.8 -49.8 25.0 274.0 36.5 25.1 25.0 -51.0 274.0 36.2 274.0 36.2 274.0 25.1 26.2 274.0 274.0 26.2 276.8 25.1 26.2 274.0 274.0 26.2 276.8 25.1 26.2 276.0 274.0 26.2 276.0 274.0 26.2 276.0	31500.0		-42.5				591.7	275.3	30.4	1.000099
251.4 - 44.9 429.5 586.5 274.0 33.2 275.0 274.0 33.2 266.8 - 449.8 55.0 4 274.6 36.2 25.0 - 51.0 -51.0 274.6 36.2 25.0 25.0 - 52.3 275.1 280.7 275.4 22.7 23.9 - 55.0 275.4 22.7 23.7 23.7 23.9 - 55.0 275.4 260.8 36.3 275.6 275.4 260.8 36.3 275.6 275.4 260.8 36.3 275.6 275.4 260.8 36.3 275.6 275.4 260.8 36.3 275.6 275.6 275.7 212.6 - 55.8 275.0 295.0 48.9 207.5 - 57.0 295.0 48.9 207.5 - 57.0 25.0 334.5 572.3 299.0 48.9 202.6 - 57.1	3200.0.0		-43.1				290.1	274.5	31.8	1.000097
266.8 -47.3 414.7 565.4 274.3 34.5 266.2 48.6 49.6 56.2 256.8 -49.8 56.5 256.8 -49.8 274.6 36.5 256.8 -49.8 251.0 274.6 36.5 251.0 274.6 36.5 251.0 274.6 36.5 251.0 274.6 36.5 251.0 275.8 32.7 23.9 -52.3 -52.7 23.9 -55.0 35.0 20.8 20.8 20.8 20.8 20.8 20.8 20.8 20	22500.0		6.44-			•	588.5	0.472	33.2	1.000096
262.7 -48.6 274.1 36.2 256.8 274.1 36.2 256.8 -49.8 256.8 407.5 563.0 274.6 36.5 256.8 -49.8 256.8 274.6 36.5 255.1 255.1 25.1 25.1 25.1 25.1 25.1	23000.0		-46.1			·	587.0	274.3	34.5	1.000094
262.7 -48.5 274.6 36.5 256.8 -49.8 255.8 250.4 35.1 255.8 251.0 251.0 250.4 560.7 270.4 32.7 245.2 -52.3 270.4 32.7 250.8 570.0 270.4 32.7 250.5 250.9 570.0 270.4 32.7 250.9 570.0 270.4 32.7 37.3 220.9 270.8 36.3 37.3 220.8 250.8 36.3 37.7 250.9 250.9 36.3 37.7 250.9 250.9 350.9 250.9 20.0 48.9 20.7 20.6 -55.8 20.7 37.0 295.0 48.9 20.7 5.5 20.6 57.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 32.0 20.7 20.7 20.7 20.7 20.7 20.7 20.7 2	33200.0		-47.3			·	565.4	274.1	36.5	1.000092
256.8 -49.8 275.4 35.1 251.0 251.0 251.0 251.0 252.4 32.7 252.3 25	3400000		-48.5			1.	583.0	574.6	36.5	1.000001
251.0 -51.0 275.4 32.7 255.5 550.5 560.7 275.4 32.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.7 253.9 55.0 355.9 355.9 355.9 250.8 365.3 253.0 -55.5 550.5 250.8 355.7 255.9 255.0 255.0 255.0 255.0 255.0 255.0 255.0 255.0 255.0 48.9 207.5 -57.0 295.0 48.9 202.6 -57.1	34500.0		8.64-				585.3	275.8	35.1	1.000089
245.2 -52.3 239.5 -53.7 239.5 -55.0 223.9 -55.0 223.9 -55.0 223.0 -55.9 23.0 -55.9 23.0 -55.9 25.0 -55.9 25.0 -55.0 20.1 -55.0 20.2 -55.0 20.2 -57.0 20.2 -57.0 20.2 -57.0 20.2 -57.0	35000.0		-51.0			0	560.7	273.4	32.7	1.000088
239.5 -53.7 1.00008 233.9 -55.0 375.6 575.4 260.8 36.3 1.00008 228.4 -55.9 365.3 1.00008 36.3 1.00008 223.0 -50.5 355.7 27.2 243.7 39.5 1.00008 217.7 -56.7 37.2 27.2 44.7 1.00007 207.5 -56.8 384.5 572.0 48.9 1.00007 202.6 -57.1 326.8 572.6 48.9 1.00007 1.00007 -57.1 -57.6 1.00007	35500.0		-52.3				575.9	279.8	32.7	1.000086
23.9 -55.0 373.6 575.4 280.8 36.3 1.00008 228.4 -55.9 39.5 1.00008 355.5 574.2 283.7 39.5 1.00008 223.0 -50.5 36.7 355.4 291.3 40.4 1.00008 212.6 -56.7 36.4 573.2 292.5 44.7 1.00007 207.5 -55.8 334.5 572.3 299.0 48.9 1.00007 334.5 572.3 299.0 48.9 1.00007 320.6 -57.1	3600000		-53.7			0	577.1	280.3	33.7	.00008
228.4 -55.9 355.3 574.2 283.7 39.5 1.00008 223.0 -50.5 356.7 573.4 291.3 40.4 1.00008 217.7 -56.7 36.2 573.2 292.5 44.7 1.00007 212.6 -56.8 342.4 573.0 295.0 48.9 1.00007 207.5 -57.0 334.5 572.3 299.0 48.9 1.00007 202.6 -57.1 572.6 572.6 1.00007	30200.0		-55.0			.0	575.4	280.8	36.3	*0000·
223.0 -50.5 356.7 573.4 291.3 40.4 1.00008 217.7 -56.7 350.4 573.2 292.5 44.7 1.00007 212.6 -56.8 342.4 573.0 295.0 48.9 1.00007 0 207.5 -57.0 334.5 572.3 299.0 48.9 1.00007 0 202.6 -57.1 326.8 572.6 1.00007	37000.0		-53.9			.0	574.2	283.7	39.5	.0000R
217.7 -56.7 350.4 573.2 292.5 44.7 1.00007 212.6 -56.8 342.4 573.0 295.0 48.9 1.00007 0 207.5 -57.0 334.5 572.3 299.0 48.9 1.00007 0 202.6 -57.1 326.8 572.6 1.00007	37500.0	223.0	-50.5				573.4	291.3	40.4	.00008
0 212.6 -55.8 342.4 575.0 295.0 48.9 1.00007 0 207.5 -57.0 334.5 572.3 299.0 48.9 1.00007 0 202.6 -57.1 326.8 572.6 1.00007		217.7	-56.7			-	570.2	252.5	44.7	.00007
0.0 207.5 -57.0 48.9 1.00007 0.0 202.6 -57.1 326.8 572.6 1.00007		212.6	-55.8			31	570.0	295.0	48.9	20000
•0 202•6 -57•1 326•8 572•6 1•00007	0	201.5	-57.0			•	572.3	66	48.9	10000
		202.6	-57.1				574.0			10000

** AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALIITUDE 3997.30 FEET MSL 23 APR. 79 1100 HRS MST ASCENSION MO. 70

MANDATORY LEVELS 11300-0070 S M R

GEODETIC COORDINATES 32.48034 LAT DEG 106.42307 LON DEG

PRESSURE GEOPOTE, TIAL TEMPERATURE REL.HUM. WIND DATA AIR DEWPOINT PERCENT DIRECTION SPEED BOOM 6529. 13.5 2.9 49. 210.0 4.3 750.0 6529. 13.5 2.9 59. 224.5 44.3 750.0 10270. 6.1 -5.5 50. 227.4 7.1 650.0 1435. -4.7 -10.7 63. 220.0 7.0 600.0 1435. -4.7 -10.7 63. 220.0 7.0 600.0 1435. -4.7 -10.7 63. 220.0 7.0 7.0 600.0 1562. -8.9 -28.7 18. 278.0 11.7 550.0 24410. -25.3 -443.1 17. 313.1 12.4 450.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512 250.0 27512

WRI, MANDATORY LEVELS	11300c0070 S M R
	STATION ALTITUDE 3997.30 FEET MSL 23 APR. 79 1100 HRS MST ASCENSION NO. 70
	STATION ALTITUDE 39 23 APR. 79 ASCENSION NO. 70

To the second

GEODETIC COORDINATES 32.48034 LAT DEG 106.42307 LON DES

	чv													
i i	MILLIBARS	2.500+2	3.000+2	3.500+2	4.000+2	4.500+2	5.000+2	5.500+2	2+000-9	6.500+2	7.000+2	7.500+2	8.000+2	8.500+2
TEN	DEG C	-51.2	-41.5	-32.7	-25.3	-19.4	-13.1	-8.9	L-4-7	1.0	6.1	9.6	13.5	19.1
	DEW PT DEP	66	66	16	18	11	1.7	20	00	07	10	90	11	15
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ONIM	SPELD	17.	1.5						ŧ		. 1	,		
	DIRECTION DEG (TN)	279.	275.	288.	313.	300	295	279.	210.	226.	217.	234.	211.	134.
GEOPOTENTIAL	ALTITUDE DECAMETERS	1067.	100	010	750	. 658	573	505	437.	173.	3 3 3	0.40	20%	151